

Application No.: 09/980,266

IN THE CLAIMS

Claims 1-38 (canceled)

39. (currently amended) A process for producing an injectable medicament preparation comprising: dissolving at least one of a therapeutically effective substance ~~or diagnostically effective substance~~ in an injectable carrier liquid, wherein the therapeutically ~~diagnostically~~ effective substance ~~is of a compound which~~ comprises an active compound selected from the group consisting of cytostatic agent, a cytokine, an immunosuppressive agent, a virostatic agent, an antirheumatic agent, an analgesic, an antiinflammatory agent, an antibiotic, an antimicrobial agent, a signal transduction inhibitor, an angiogenesis inhibitor or a protease inhibitor and at least one covalently protein-binding molecular residue selected from the group consisting of maleimide, haloacetamide, haloacetate, pyridylthio, N-hydroxysuccinimide ester, isothiocyanate, disulphide, vinylcarbonyl, aziridine and acetylene which are linked by a spacer comprising an organic molecular residue, which contains at least one aliphatic carbon chain, or an aliphatic carbon ring having 1-12 carbon atoms, some of which can be replaced with oxygen, or at least one aromatic moiety, in which the spacer, or the bond between the active compound and the spacer, can be cleaved hydrolytically or enzymatically in the body of a subject in a pH-dependent manner.

40. (currently amended) The process according to claim Claim 39, wherein the spacer, or the bond between the active compound and the spacer, can be cleaved in the body of the subject, with the release of the active compound or of a derivative of the active compound.

41. (currently amended) The process according to claim 39, wherein the active compound is doxorubicin ~~a cytostatic agent, a cytokine, an immunosuppressive agent, a virostatic agent, an antirheumatic agent, an analgesic, an antiinflammatory agent, an antibiotic, an antimicrobial agent, a signal transduction inhibitor, an angiogenesis inhibitor or a protease inhibitor.~~

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42. (previously presented) The process according to claim 39, wherein the active compound is selected from the group consisting of anthracyclines, nitrogen mustard derivatives, alkylating agents, purine or pyrimidine antagonists, folic acid antagonists, taxanes, camptothecins, podophyllotoxin derivatives, vinca alkaloids, calicheamicins, maytansinoids or cis-configured platinum (II) complexes.

43. (currently amended) The process according to claim 39, wherein said peptide binding molecule is phenylacetylhydrazone ~~the diagnostically effective substance possesses one or more radionuclides, one or more ligands comprising radionuclides, one or more position emitters, one or more NMR-contrast agents, one or more fluorescent compound(s) or one or more contrast agents in the near-IR range.~~

44. (currently amended) The process according to claim 39, wherein the protein-binding molecule is a maleimide ~~group, a haloacetamide group, a haloacetate group, a pyridylthio group, an N-hydroxysuccinimido ester group, an isothiocyanate group, a disulphide group, a vinylcarbonyl group, an aziridine group or an acetylene group, which can, where appropriate, be substituted.~~

45. (currently amended) The process according to claim ~~41~~ 39, wherein the spacer is phenylacetylhydrazone ~~an organic molecular residue, which contains at least one aliphatic carbon chain, or an aliphatic carbon ring having 1-12 carbon atoms, some of which can be replaced with oxygen, or at least one aromatic moiety, which can, where appropriate, be substituted.~~

46. (currently amended) The process according to claim ~~45~~ 39, wherein said protein-binding molecular residue is maleimide ~~the bond between the active compound and the spacer or the protein-binding molecular residue contains at least one peptide bond.~~

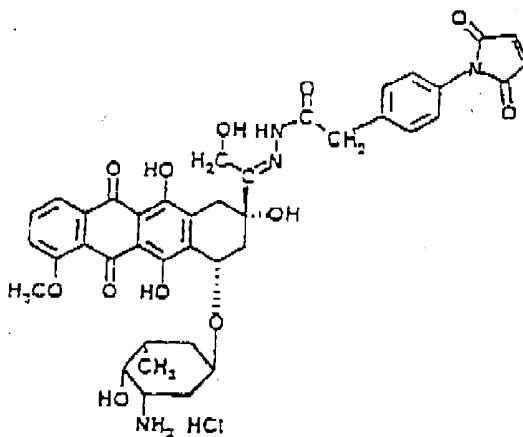
47. (currently amended) The process according to claim 39, further comprising a carrier molecule.

48. (new) The process according to claim 47, wherein the carrier molecule and the therapeutically or diagnostically effective substance are brought into contact ex vivo.

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49. (new) A therapeutically or diagnostically effective substance comprising at least one active compound selected from the group consisting of cytostatic agent, a cytokine, an immunosuppressive agent, a virostatic agent, an antirheumatic agent, an analgesic, an antiinflammatory agent, an antibiotic, an antimicrobial agent, a signal transduction inhibitor, an angiogenesis inhibitor or a protease inhibitor, at least one protein-binding molecular residue selected from the group consisting of maleimide, haloacetamide, haloacetate, pyridylthio, N-hydroxysuccinimide ester, isothiocyanate, disulphide, vinylcarbonyl, aziridine and acetylene which is linked to the active compound through a spacer comprising an organic molecular residue, which contains at least one aliphatic carbon chain, or an aliphatic carbon ring having 1-12 carbon atoms, some of which can be replaced with oxygen, or at least one aromatic moiety, with the spacer, or the bond between the spacer and the active compound, being cleavable hydrolytically or enzymatically in the body in a pH-dependent manner, and whereas the active compound is not a cytostatic agent.

50. (currently amended)) ~~A diagnostically effective substance comprising at least one diagnostic agent, wherein at least one protein-binding molecular residue which is linked to the diagnostic agent by means of a spacer, with the spacer, or the bond between the spacer and the diagnostic agent, being hydrolytically or enzymatically cleavable in the body in a pH-dependent manner~~ The compound of formula



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51. (currently amended) A method for treating cancer diseases, virus diseases, autoimmune diseases, acute or chronic inflammatory diseases and diseases which are caused by bacteria, fungi or other microorganisms comprising administering the therapeutically or ~~diagnostically effective substance~~ of claim 49 to a patient.

52. (previously presented) A diagnostic kit comprising a protein-binding diagnostically effective substance according to claim 49, pharmaceutically acceptable auxiliary, substance, a carrier or a diluent.

53. (previously presented) A method for detecting cancer diseases, auto immune diseases, acute or chronic inflammatory diseases and diseases which are caused by viruses or microorganisms, or for detecting the carrier molecule and its distribution in the body comprising utilizing the kit of claim 52.

54. (currently amended) A process for producing an injectable medicament preparation, which comprises a diagnostically effective substance which is dissolved in an injectable carrier liquid, wherein the diagnostically effective substance ~~is a compound which comprises a diagnostic agent selected from the group consisting of a radionuclide, a positron emitters, a NMR contrast agent, a fluorescent compound and a contrast agent in the near IR range, a spacer comprising an organic molecular residue, which contains at least one aliphatic carbon chain, or an aliphatic carbon ring having 1-12 carbon atoms, some of which can be replaced with oxygen, or at least one aromatic moiety, and at least one protein-binding molecular residue selected from the group consisting of maleimide, haloacetamide, haloacetate, pyridylthio, N-hydroxysuccinimide ester, isothiocyanate, disulphide, vinylcarbonyl, aziridine and acetylene.~~

55. (currently amended) A process according to claim 54, wherein said spacer is phenylacetylhydrazone ~~claim 54, wherein the diagnostic agent and the protein binding molecular residue are linked by a spacer.~~

56. (currently amended) A process according to claim 54 ~~Claim 35~~, wherein the bond between the diagnostic agent and the protein-binding molecular residue or the spacer is not cleavable.

